

PROJECT DESCRIPTION

I. GENERAL

THIS PROJECT INVOLVES THE MODIFICATION OF THE EXISTING TRAFFIC SIGNAL AT THE INTERSECTION OF MD 180/MD 351 AND US 340/US 15 RAMP/HIMES AVENUE IN FREDERICK COUNTY. THE IMPROVEMENTS INCLUDE UPGRADING EXISTING LOOP DETECTION TO VIDEO DETECTION AND NON-INVASIVE PROBES AT THE INTERSECTION. MD 180 IS ASSUMED TO RUN IN AN EAST/WEST DIRECTION.

II. INTERSECTION OPERATION

THE INTERSECTION OPERATES IN A NEMA FOUR-PHASE, FULL-TRAFFIC-ACTUATED MODE. MD 180 THROUGH MOVEMENTS WILL OPERATE CONCURRENTLY. US 340 RAMP AND HIMES AVENUE WILL OPERATE AT SPLIT PHASES. THERE ARE NO PEDESTRIAN PHASES FOR ALL FOUR LEGS OF THE INTERSECTION.

EQUIPMENT LIST FOR CONTRACT NO. XX3555168

A. EQUIPMENT TO BE FURNISHED BY STATE: HIGHWAY ADMINISTRATION

ITEM	QUANTITY	UNIT	DESCRIPTION
9086	1	EA	[UPDATED] VIDEO DETECTION INTERFACE EQUIPMENT: 1-4 CAMERAS

B. EQUIPMENT TO BE FURNISHED AND/OR INSTALLED BY CONTRACTOR

ITEM	QUANTITY	UNIT	DESCRIPTION
8007	3	EA	VIDEO DETECTION CAMERA & CABLE
8011	250	LF	SCHEDULE 80 RIGID PVC CONDUIT UP TO 4 INCH - BORED
8012	50	LF	SCHEDULE 80 RIGID PVC CONDUIT UP TO 4 INCH - SLOTTED
8013	300	LF	SCHEDULE 80 RIGID PVC CONDUIT UP TO 4 INCH - TRENCHED
8018	3	EA	NONINVASIVE DETECTOR, 1000 FOOT LEAD IN CABLE
8019	6	EA	FURNISH AND INSTALL ELECTRICAL HANDHOLE

C. EQUIPMENT TO BE REMOVED.

ALL EXISTING SIGNAL EQUIPMENT REMOVED SHALL BECOME THE PROPERTY OF THE SIGNAL CONTRACTOR UPON COMPLETION OF THE SIGNAL.

CONTACTS

Mr. John ConCannon
Assistant District Engineer - Traffic
Phone: (301) 624-8140/8141

Ms. Susan Palmer
Assistant District Engineer - Maintenance
Phone: (301) 624-8105/8106

Mr. Andre Abend
Utility Engineer
Phone: (301) 624-8115/8116

Mrs. Corren Johnson
Chief, Traffic Operations Division
Phone: (410) 787-7630

Mr. Ed Rodenhizer
Supervisor, Signal Operations
Phone: (410) 787-7650

PHASE CHART

1	2	3	4	5	6	7	8	9	10	11	12
R Y G	R Y G	R Y G	R Y G	R Y G	R Y G	R Y G	R Y G	R Y G	R Y G	R Y G	R Y G
G	G	G	G	G	G	G	G	G	G	G	G

PHASE 2 AND 6	G	G	G	G	G	G	R	R	R	R	R	R
2 AND 6 CHANGE	Y	Y	Y	Y	Y	Y	R	R	R	R	R	R
PHASE 3	R	R	R	R	R	R	←G/G	←G/G	G	R	R	R
3 CHANGE	R	R	R	R	R	R	Y	Y	Y	R	R	R
PHASE 4	R	R	R	R	R	R	R	R	R	←G/G	←G/G	G
4 CHANGE	R	R	R	R	R	R	R	R	R	Y	Y	Y
FLASHING OPERATION	FL/Y	FL/Y	FL/Y	FL/Y	FL/Y	FL/Y	FL/R	FL/R	FL/R	FL/R	FL/R	FL/R

WIRING DIAGRAM

MD 180 IS ASSUMED TO RUN
IN AN EAST/WEST DIRECTION

WIRING KEY
A } EXISTING INTERCONNECT
a,b,c } VIDEO CAMERA CABLE
d,e,f } NON-INVASIVE CABLE

TOD NO: XX355-18
SHA NO: FR642K55
MD 180 @ Various Locations

SHA

STATE OF MARYLAND
DEPARTMENT OF TRANSPORTATION
STATE HIGHWAY ADMINISTRATION
OFFICE OF TRAFFIC & SAFETY
TRAFFIC ENGINEERING DESIGN DIVISION
MD 180/MD 351 AND
US 340/US 15 RAMP/HIMES AVENUE
FREDERICK, MD

GENERAL INFORMATION PLAN SHEET

SCALE NONE ADVERTISED DATE 06/2013 CONTRACT NO. XX3555168

DESIGNED BY CW COUNTY FREDERICK
DRAWN BY CW LOGMILE 10018014 B6
CHECKED BY RM L432
F.A.P. NO. TOD NO.

TS NO. 2617-C DRAWING SG-4 OF 4 SHEET NO. 2 OF 2

BAI

BRUDIS & ASSOCIATES, INC.
Consulting Engineers
9240 Rumsay Road, Suite C
Columbia, Maryland 21046
Phone: 410-816-3807
www.brudis.com

PLOTTED: Wednesday, May 22, 2013 AT 02:37 PM
FILE: P:\09-002 TEDD\Task 125 MD 180 @ Various Locations\Drawings\CADD\Working\US340\PSG-P003_M108@US_340.dgn

BY: fanyong